

A graph showing the relationship between I_{OUT} (vertical axis) and I_{IN} (horizontal axis). The graph displays two functions:

- ACTUAL:** A solid curve that is U-shaped, representing the actual relationship.
- ABSOLUTE-VALUE FUNCTION:** A dashed V-shaped line representing the ideal absolute-value function.

The vertical distance between the two curves at the origin is labeled $2I_0$, indicating the offset or bias in the actual function.

FIG.2

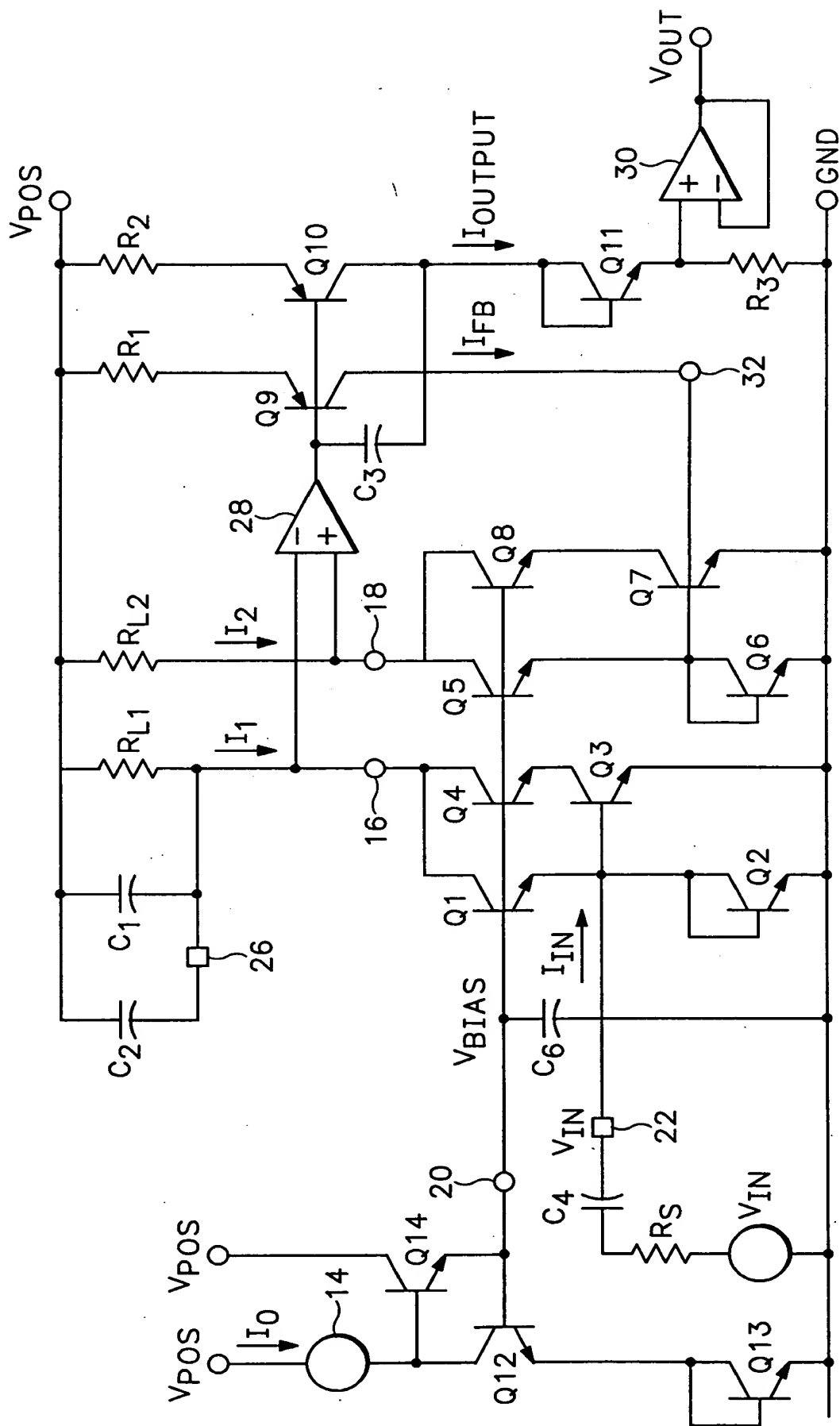


FIG.3

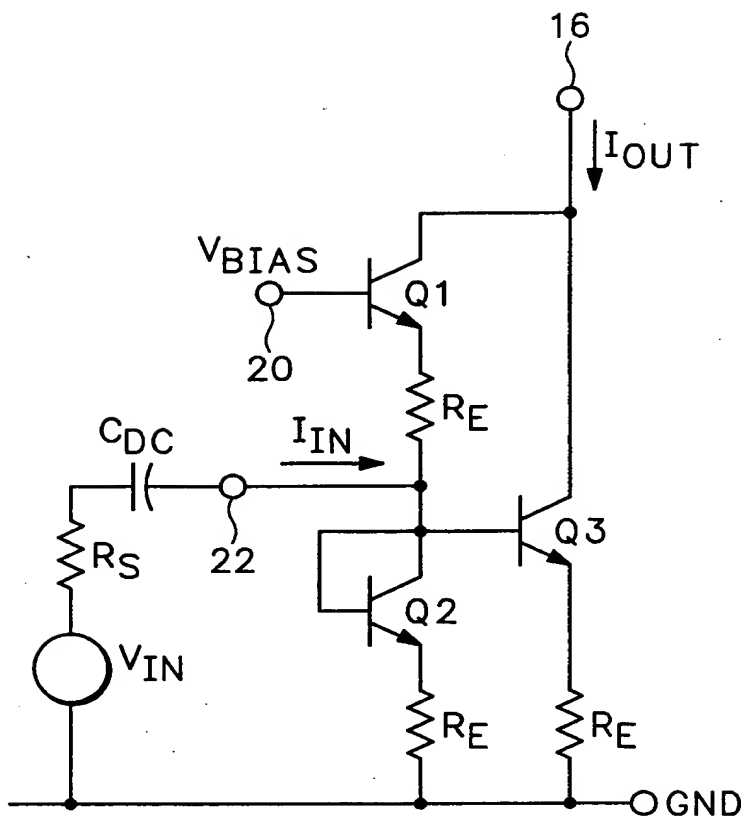


FIG.4

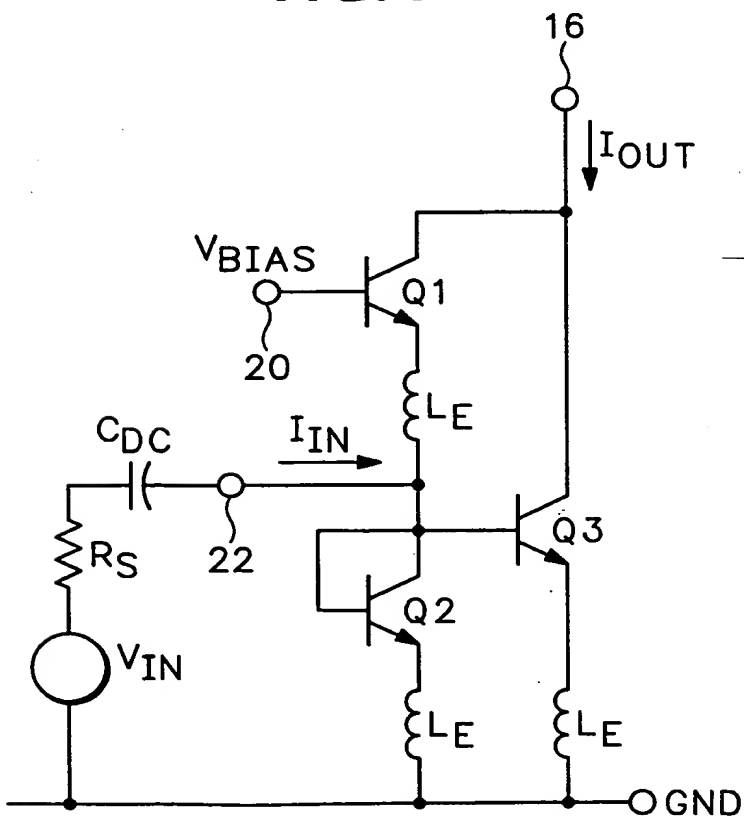


FIG.5

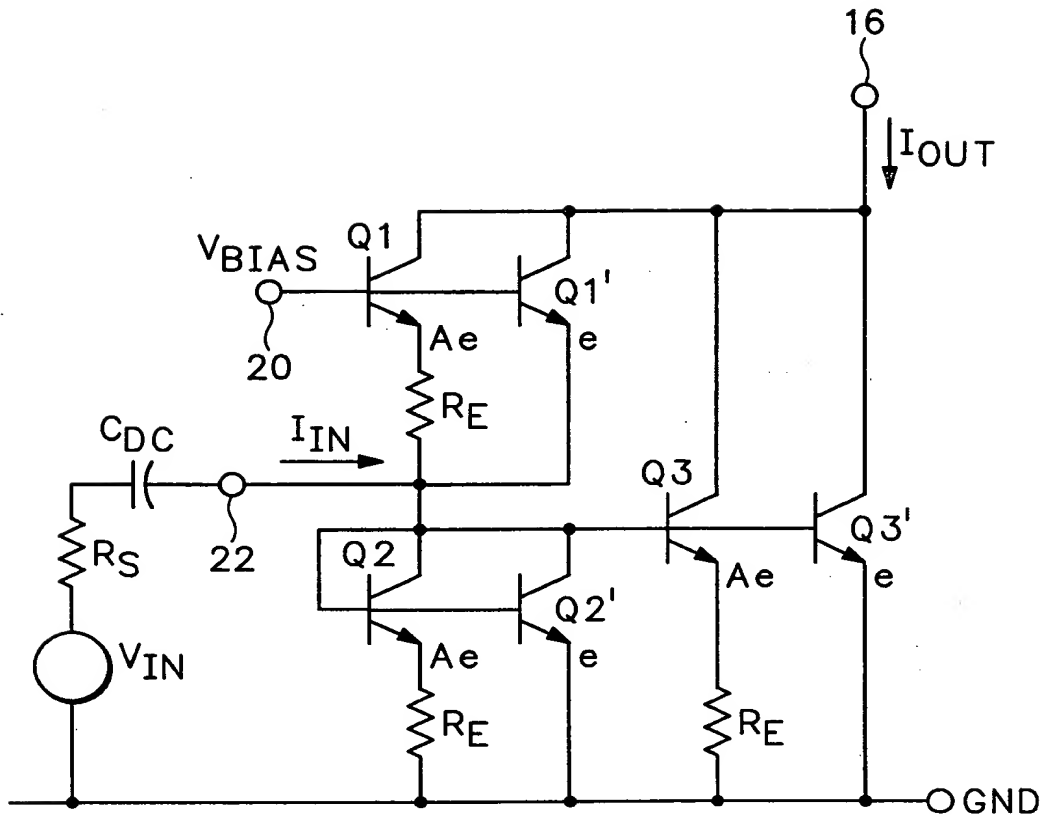


FIG.6

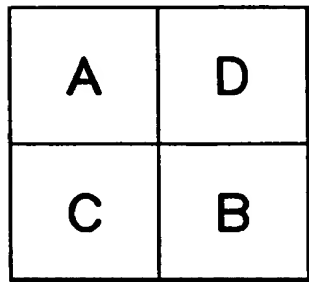


FIG.8

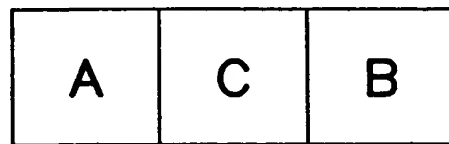
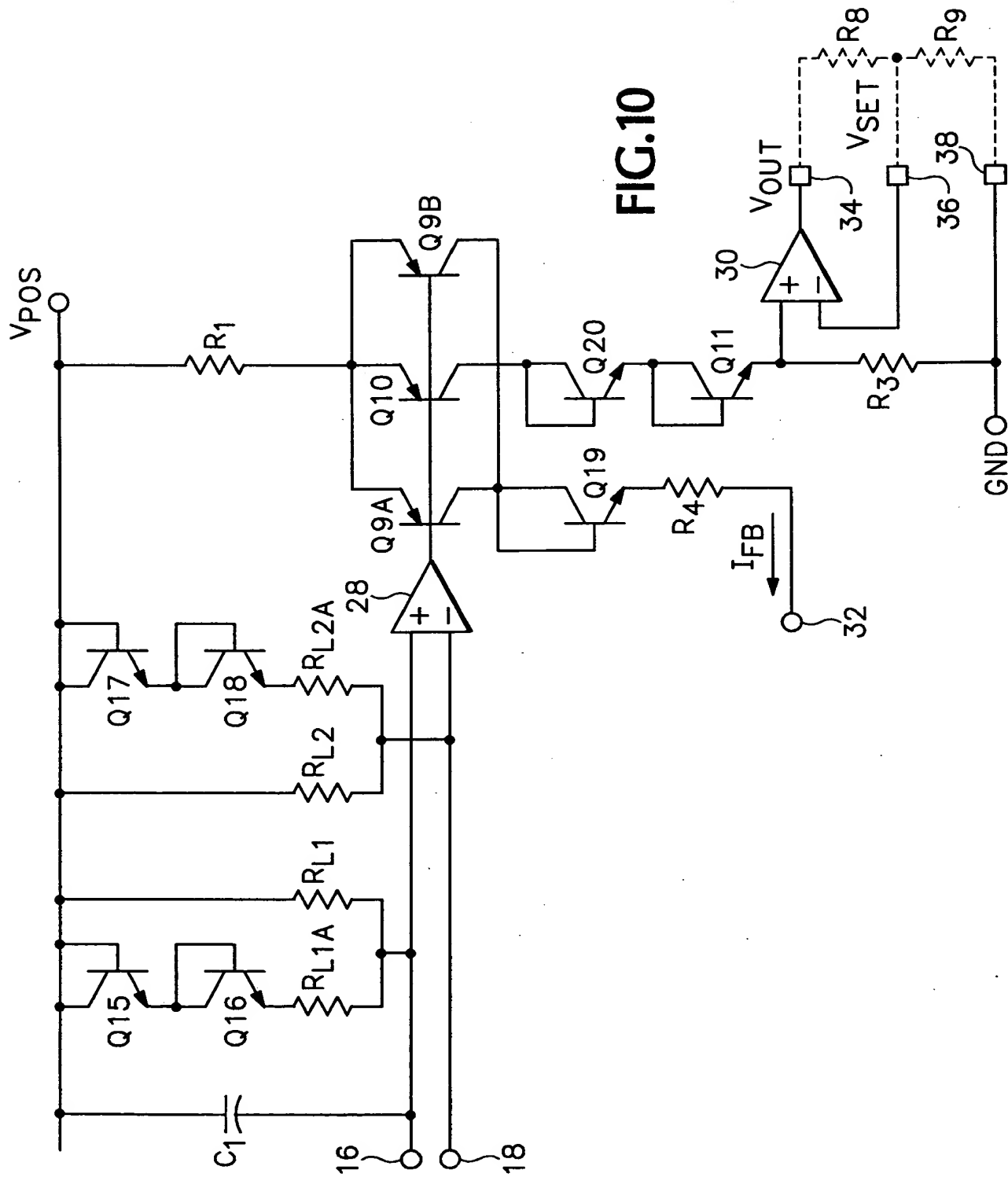


FIG.9

FIG. 7



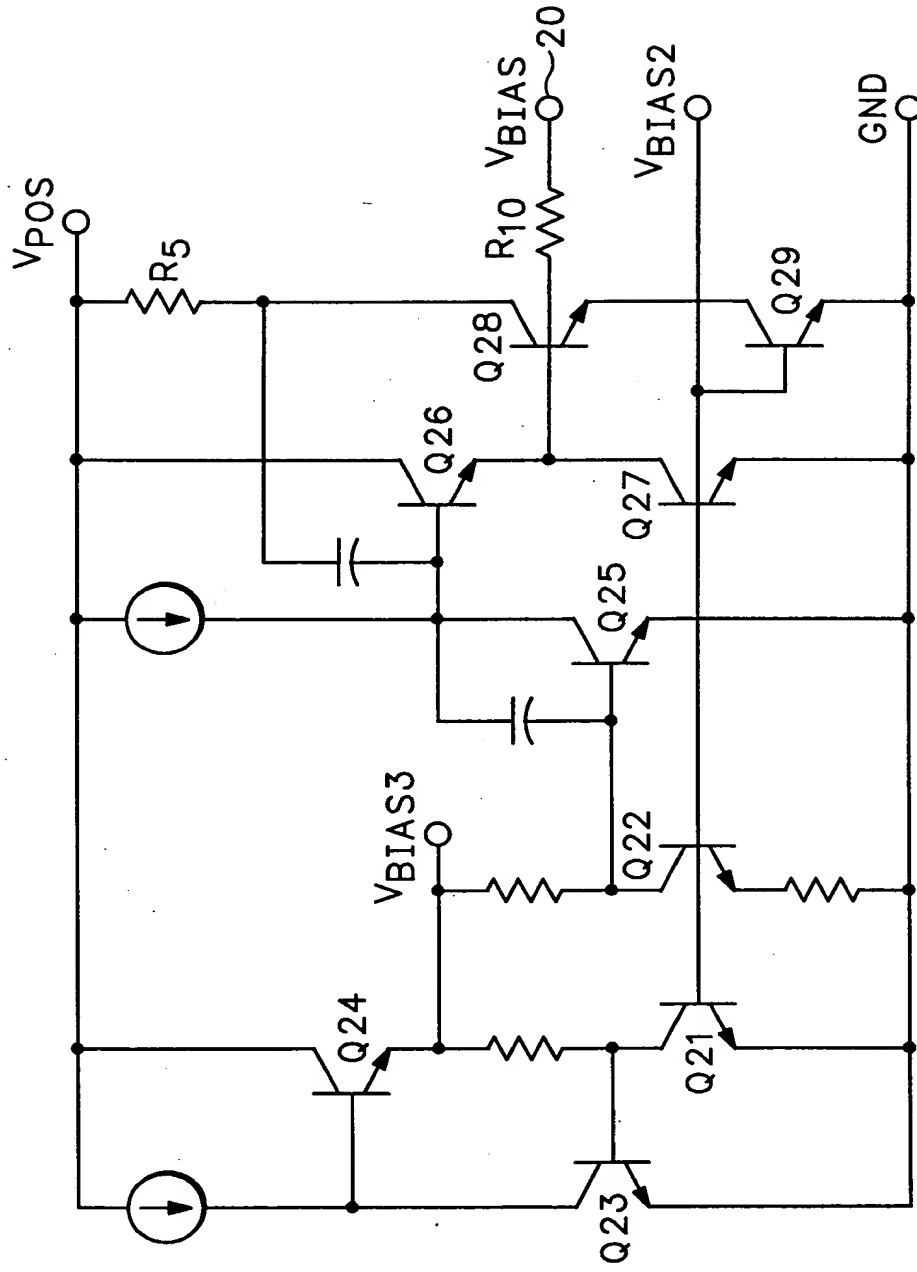
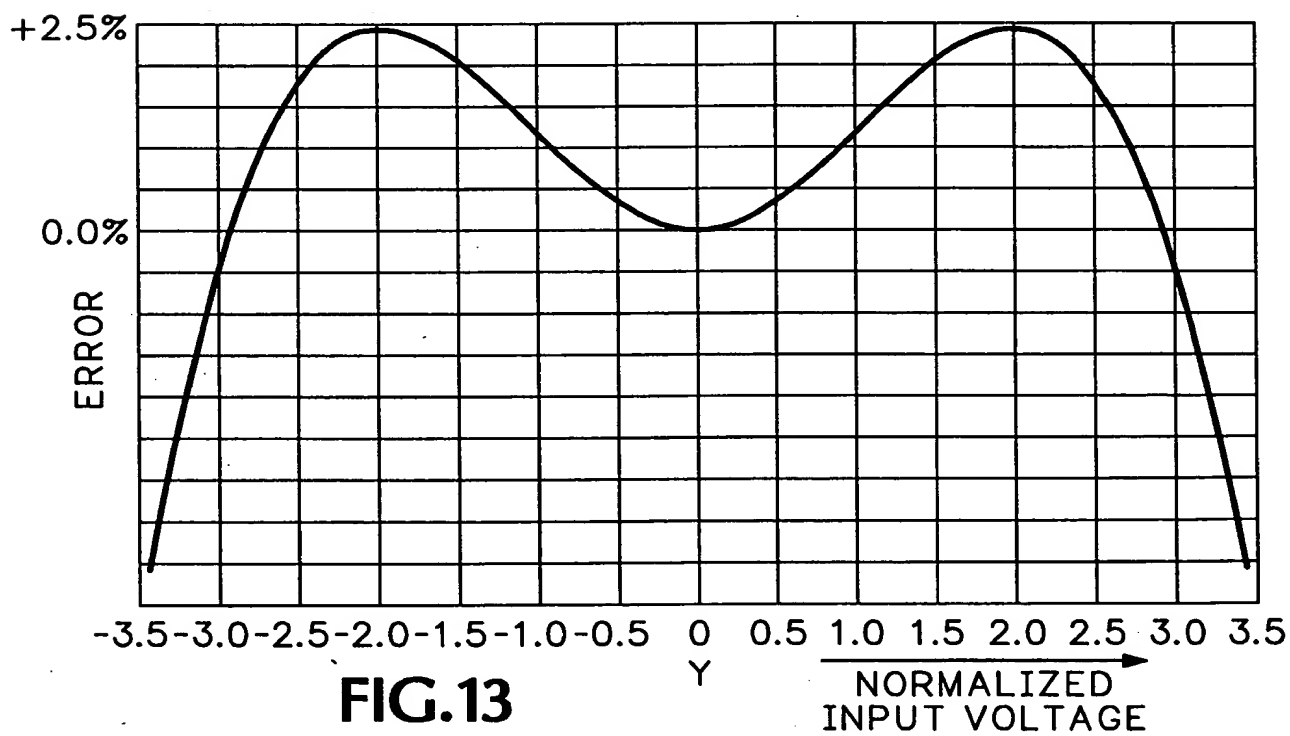
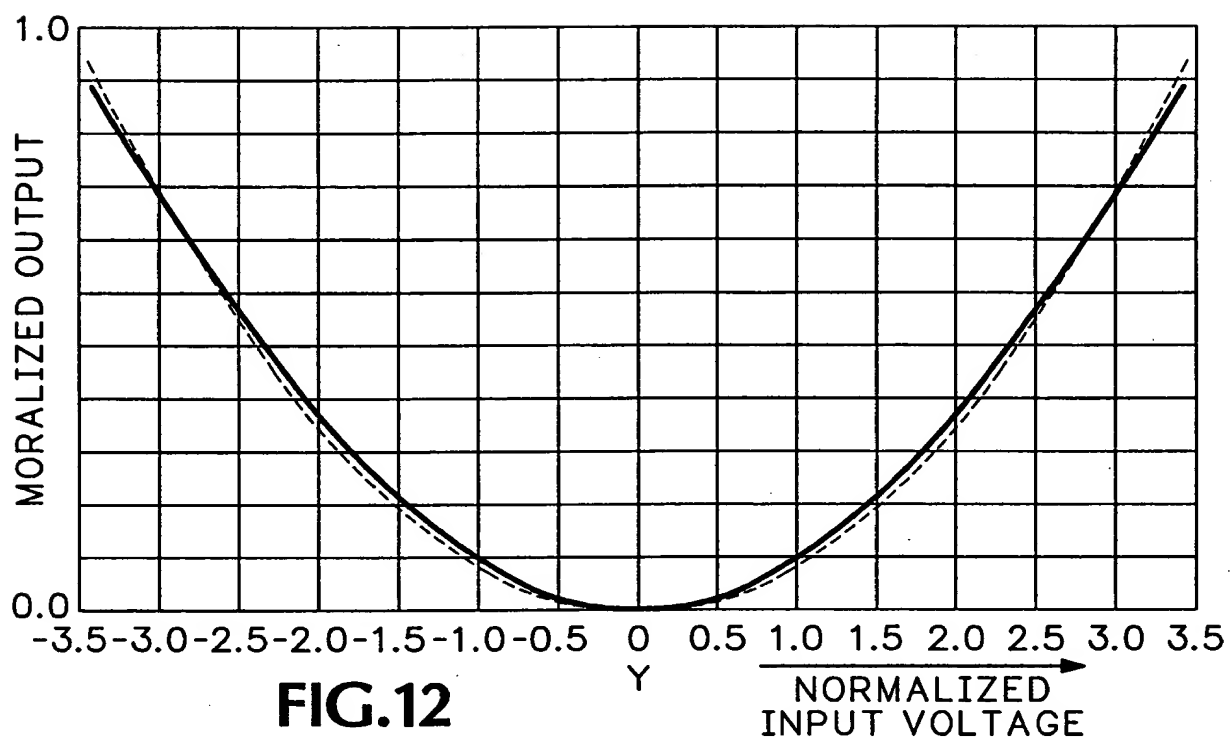
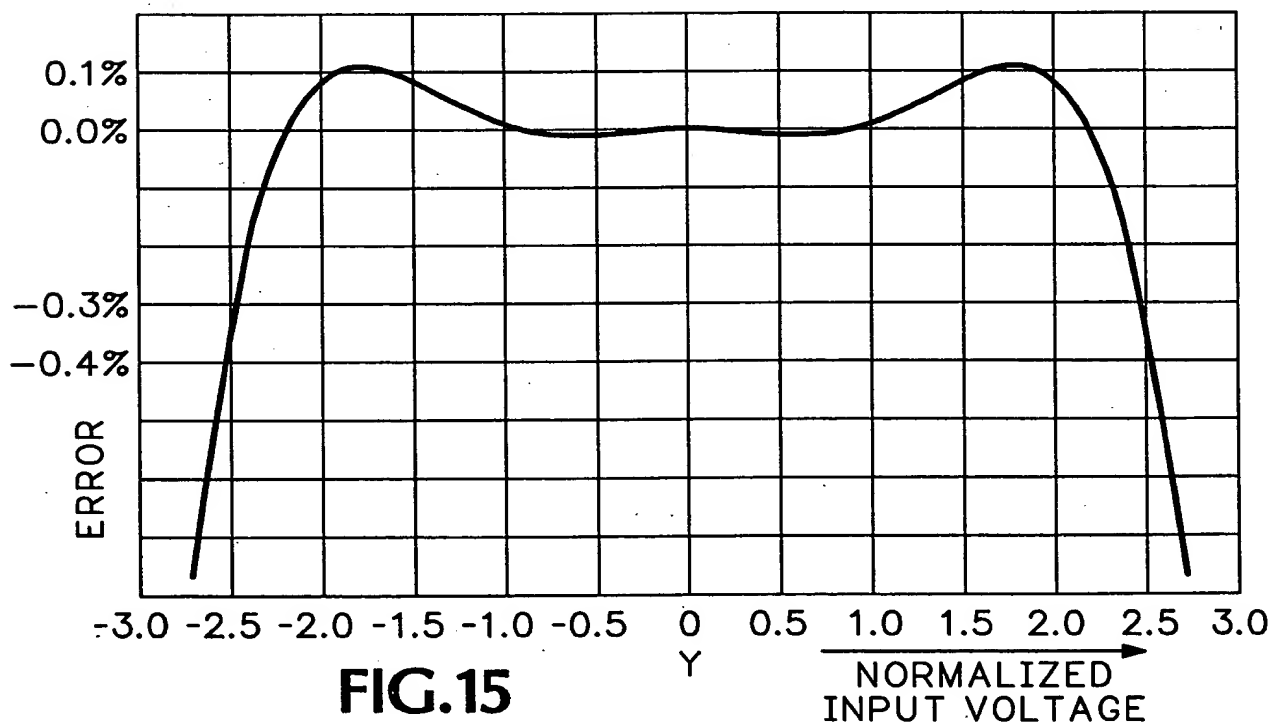
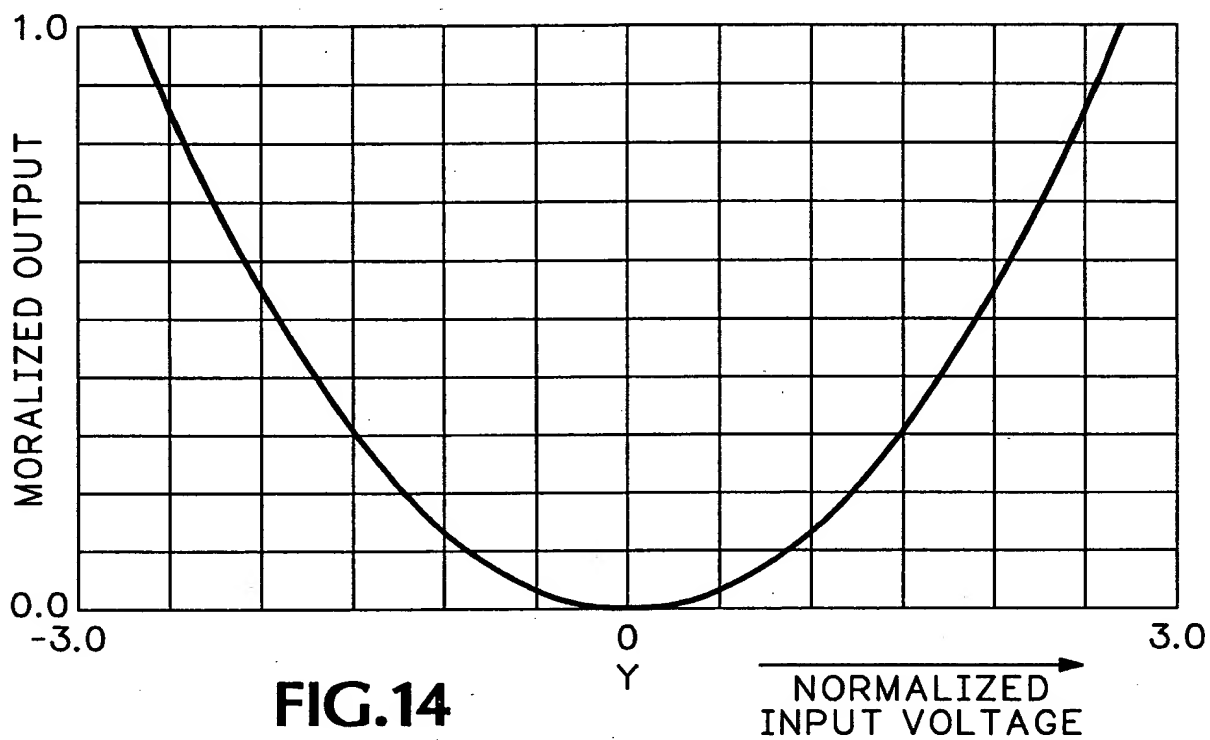


FIG.11

000001-72240900





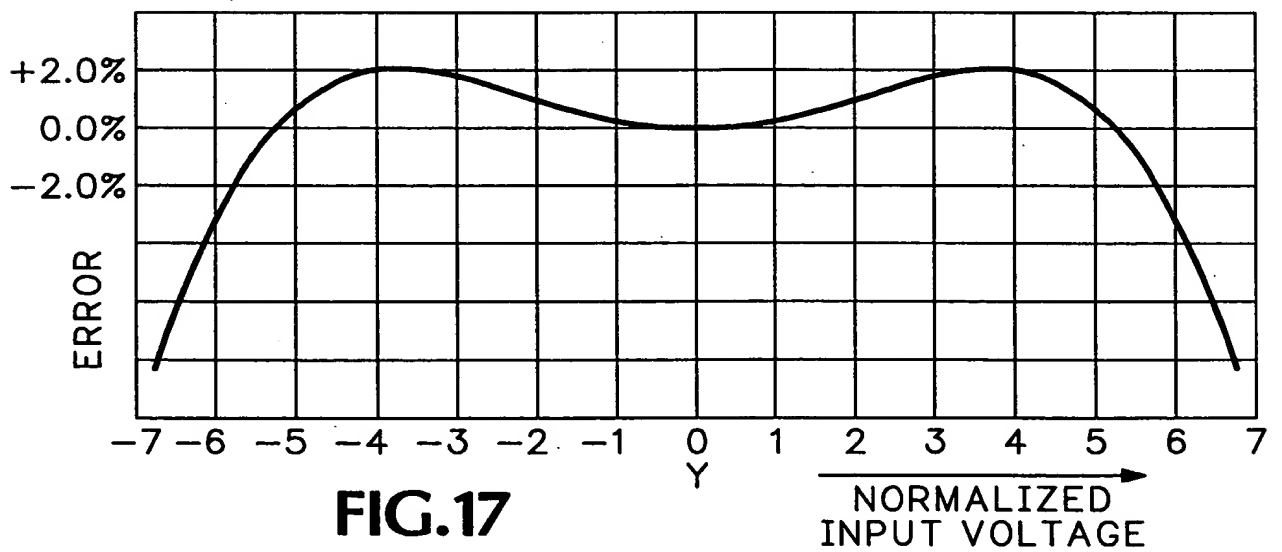
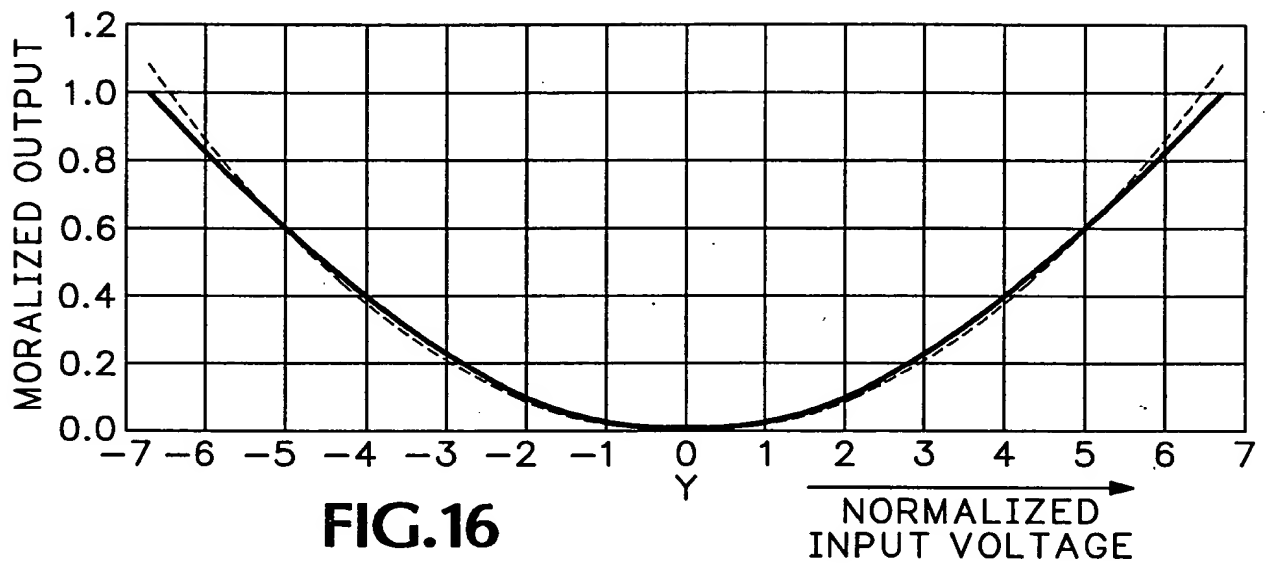


FIG. 18 is a circuit diagram of a differential amplifier. The circuit includes a differential pair of transistors, Q15 and Q17, whose emitters are connected to a common emitter resistor R_{L2}. The collectors of Q15 and Q17 are connected to a common collector resistor R_{L2A}. The bases of Q15 and Q17 are connected to a common base resistor R_{L1A}. The circuit is powered by a positive supply voltage V_{POS} and a negative supply voltage V_{NEG}. A capacitor C₁ is connected between the V_{POS} supply and the base of Q15. The output of the differential amplifier is taken from the collector of Q17, which is connected to a load resistor R_{L2A}. The input of the differential amplifier is taken from the base of Q15, which is connected to a load resistor R_{L1A}. The circuit is labeled FIG. 18.

FIG.18